

## **2. Amendments to the Claims:**

A listing of the entire set of pending claims (including amendments to the claims, if any) is submitted herewith per 37 CFR 1.121. This listing of claims will replace all prior versions, and listings, of claims in the application.

### **Listing of Claims:**

1. (Currently Amended) An ultrasound probe, comprising:

a housing including a plurality of seams at least one seam, each of which extends  
~~extending~~ from an exterior of said housing to an interior of said housing;

a sensor assembly arranged in said housing and including electrically conductive parts, said sensor assembly being arranged to transmit and receive waves; and  
an acoustic window along a side of the probe;

an acoustic matching layer arranged in said housing between said electrically conductive parts of said sensor assembly and each of the seams said at least one seam, wherein one of the seams is not along the side of the acoustic window, said acoustic matching layer being arranged to acoustically influence waves transmitted and received by said sensor assembly in a desired manner.

2. (Previously Presented) The probe of claim 1, wherein said matching layer is arranged entirely around said electrically conductive parts of said sensor assembly.

3. (Previously Presented) The probe of claim 1, wherein said housing comprises first and second housing parts with a seam being formed therebetween, said matching layer extending from a location alongside said first housing part to a location alongside said second housing part and thereby extending across said seam between said first and second housing parts .

4. (Currently Amended) The probe of claim 1, wherein the ~~further comprising an~~ acoustic

window is arranged in an aperture of said housing such that one of the a seams is formed between said housing and said acoustic window, said matching layer extending from a location adjacent said acoustic window to a location alongside said housing outward from said aperture and thereby extending across said seam between said housing and said acoustic window.

5. (Previously Presented) The probe of claim 1, further comprising epoxy arranged between said matching layer and said housing.

6. (Currently Amended) The probe of claim 1, ~~further comprising:~~

~~—wherein the an~~-acoustic window arranged in an aperture at a front portion of said housing, said electrically conductive parts being arranged at least partially opposite said acoustic window; and the probe further comprises:

dielectric sensor support parts arranged at a rear portion of said housing to support said electrically conductive parts, said matching layer having a closed front end and an open rear end adjacent said sensor support parts and defining an elongate cavity in which said electrically conductive parts are enclosed.

7. (Previously Presented) The probe of claim 1, wherein said matching layer is arranged to wrap over said electrically conductive parts in their entirety.

8. (Previously Presented) The probe of claim 1, further comprising a connection member connected to a rear end of said housing and defining a seam therebetween, said matching layer being arranged to extend across said seam between said connection member and said housing .

9. (Previously Presented) The probe of claim 1, wherein said matching layer comprises parylene-coated polyurethane.

10. (Previously Presented) The probe of claim 1, wherein said matching layer comprises one of a polyolefin or a thermoplastic elastomer.
11. (Previously Presented) The probe of claim 1, wherein said housing is in the form of a housing for a transesophageal echocardiographic ultrasound probe.
12. (Previously Presented) The probe of claim 1, wherein said matching layer is coated with an electrically insulative material.
13. (Previously Presented) An ultrasound probe, comprising:  
a housing;  
a sensor assembly arranged in said housing and including electrically conductive parts, said sensor assembly being arranged to transmit and receive waves; and  
an acoustic matching layer wrapped around said electrically conductive parts to electrically isolate said electrically conductive parts from said housing, said acoustic matching layer being arranged to acoustically influence waves transmitted and received by said sensor assembly in a desired manner.
14. (Previously Presented) The probe of claim 13, wherein said matching layer defines an elongate cavity having a closed front end adjacent a tip of said housing and an open rear end, said electrically conductive parts being arranged in said cavity.
15. (Previously Presented) The probe of claim 14, further comprising dielectric sensor support parts arranged at a rear portion of said housing to support said electrically conductive parts, said rear end of said matching layer being situated adjacent said sensor support parts .
16. (Previously Presented) The probe of claim 13, further comprising a connection member connected to a rear end of said housing and defining a seam therebetween, said

matching layer being arranged to extend across said seam between said connection member and said housing .

17. (Previously Presented) The probe of claim 13, wherein said matching layer comprises parylene-coated polyurethane.

18. (Cancelled).

19. (Cancelled).